

Name _____



Seasons Proportional Relationship Word Problems

1. In a certain city, the average temperature in winter is 10°C . If the temperature is directly proportional to the number of layers you wear, and you wear 4 layers, what is the temperature outside?
2. During the summer, the number of daylight hours is directly proportional to the number of hours you can spend outdoors. If you can spend 8 hours outdoors during a 12-hour day, how many hours can you spend outdoors during a 16-hour day?
3. In a particular region, the amount of rainfall received during spring is directly proportional to the number of days it rains. If it rains for 10 days and the total rainfall is 50 mm, how much rain can be expected during a 15-day period?
4. During autumn, the number of leaves that fall from a tree is directly proportional to the height of the tree. If a 20-foot tree loses 100 leaves, how many leaves can be expected from a 30-foot tree?
5. In a gardening experiment, the growth of a plant is directly proportional to the amount of sunlight it receives. If a plant grows 5 centimeters with 2 hours of sunlight, how much will it grow with 8 hours of sunlight?
6. During the spring season, the number of flowers that bloom in a garden is directly proportional to the number of hours of daylight. If the garden has 10 blooming flowers with 6 hours of daylight, how many flowers will bloom with 12 hours of daylight?
7. In a ski resort, the amount of snowfall is directly proportional to the altitude. If the resort receives 30 centimeters of snow at an altitude of 1,500 meters, how much snow can be expected at an altitude of 2,000 meters?
8. During the winter, the length of shadows cast by objects is directly proportional to the height of the objects. If a 6-foot-tall lamppost casts a shadow that is 12 feet long, how long is the shadow of a 10-foot-tall tree?
9. In a coastal area, the number of seashells washed up on the beach is directly proportional to the strength of the tide. If 100 seashells are washed up during a high tide, how many seashells can be expected during a supermoon high tide, which is twice as strong?
10. During the summer season, the amount of ice cream sold at a shop is directly proportional to the temperature. If the shop sells 100 cones of ice cream at 30°C , how many cones can be expected to be sold at 35°C ?